

Welcome to the **BP Update** - an electronic monthly update highlighting new BestPractices products and resources. This edition provides an overview of new products from June and July 2003.

PRODUCTS

July 2003

Case Studies: Chemicals – Plant-wide Assessment

[3M: Hutchinson Plant Focuses on Heat Recovery and Cogeneration During Plant-Wide Energy Efficiency Assessment](#)

3M performed a plant-wide energy efficiency assessment at its Hutchinson, Minnesota, plant to identify energy- and cost-saving opportunities. Assessment staff developed four implementation packages involving chiller consolidation, air compressor cooling improvements, a steam turbine used for cogeneration, and boiler heat recovery. Staff estimated that the plant could save 6 million kWh/yr in electricity and more than 200,000 MMBtu/yr in natural gas and fuel oil, and avoid energy costs of more than \$1 million during the first year.

Audience: Chemical industry manufacturers and plant personnel, energy managers

NEW! Steam Technical Briefs

The new Steam Technical Briefs focus on technical analysis of steam process issues, including process control schemes, heat-transfer solutions, and fuel-saving industrial heat pumps. The technical information in these eight- to sixteen-page reports will help manufacturers increase steam efficiency, reduce steam costs, and streamline production. Click on the following tech briefs to review.

Please note: these are available on-line only.

[Industrial Steam System Process-Control Systems](#)

[Industrial Steam System Heat-Transfer Solutions](#)

[Industrial Heat Pumps for Steam and Fuel Savings](#)

Audience: Manufacturers, engineers, and plant personnel, energy managers

June 2003

Case Studies: Compressed Air System

[Citation Corporation: Compressed Air System Optimization Project Saves Energy and Improves Production at Forging Plant](#)

In the 1990s, a subsidiary of the Citation Corporation, Interstate Forging, implemented a compressed air system improvement project at its Milwaukee, Wisconsin, forging plant. This improvement enabled the plant to maintain an adequate and stable pressure level using fewer compressors, which led to improved product quality and lower production downtime. The project also yielded annual energy savings of 820,000 kWh and \$45,000. With a total project cost of \$67,000, the plant achieved a simple payback of just 1.5 years.

Audience: Manufacturers, engineers, and plant personnel, energy managers

Case Studies: Other Industries**[Progressive Powder Corporation: New Infrared Curing Oven at Metal Finishing Plant Increases Production by 50%](#)**

Progressive Powder Coating in Mentor, Ohio, is a metal finishing plant that uses a convection oven in its manufacturing process. To save energy and improve production, the company installed an infrared oven in between the powder coating booth and the convection oven on its production line. This installation allowed the plant to increase its conveyor line speed and increase production by 50 percent. In addition, the plant reduced its natural gas consumption, yielding annual energy savings of approximately \$54,000. With a total project cost of \$136,000, the simple payback is 2.5 years.

Audience: Manufacturers and plant personnel, energy managers

WEB SITE UPDATES***July 2003*****[National Inventory of Manufacturing Assistance Programs \(NIMAP\) Database](#)**

The NIMAP database lists federal, state, and utility organizations that provide energy management assistance to industry. These organizations assist eligible industrial plants with technical information, plant assessment, research and development, and financial support.

[Process Heating and Assessment Software Tool \(PHAST\)](#)

This new software tool, now available online, surveys all process heating equipment within a facility, selects the equipment that uses the most energy, and identifies ways to increase efficiency. It can also be used to assess equipment performance under various operating conditions and “what if” scenarios.

Visit the [Software Tools](#) page of the BestPractices Web site or click on the links below to review the five **new** two-page fact sheets reviewing each of the BestPractices software tools:

[AIRMaster+](#)

[MotorMaster+](#)

[Pumping System Assessment Tool \(PSAT\)](#)

[Steam System Assessment Tool](#)

[Steam System Scoping Tool](#)

ENERGY MATTERS NEWSLETTER

Summer 2003 issue and Energy Matters Extra – Coming Soon!

[BestPractices Calendar](#)

[BestPractices Training Calendar](#)